#### DEPARTMENT OF TRANSPORTATION

DIVISION OF ENGINEERING SERVICES Office of Structural Materials

Quality Assurance and Source Inspection

Bay Area Branch 690 Walnut Ave.St. 150 Vallejo, CA 94592-1133 (707) 649-5453 (707) 649-5493



Contract #: 04-0120F4

Cty: SF/ALA Rte: 80 PM: 13.2/13.9

File #: 69.28

## WELDING INSPECTION REPORT

Resident Engineer: Siegenthaler, Peter **Report No:** WIR-019724 Address: 333 Burma Road **Date Inspected:** 04-Jan-2011

City: Oakland, CA 94607

**OSM Arrival Time:** 700 **Project Name:** SAS Superstructure **OSM Departure Time:** 1900 **Prime Contractor:** American Bridge/Fluor Enterprises, a JV

Contractor: Zhenhua Port Machinery Company, Ltd (ZPMC), Changxing Island **Location:** Shanghai, China

**CWI Name:** Oiu Wen. **CWI Present:** Yes No **Inspected CWI report:** Yes N/A **Rod Oven in Use:** Yes No No N/A N/A **Electrode to specification:** Yes No Weld Procedures Followed: Yes No N/A N/A **Qualified Welders:** Yes No **Verified Joint Fit-up:** Yes No N/A N/A Yes N/A **Approved Drawings:** Yes No **Approved WPS:** No Yes No N/A **Delayed / Cancelled:** 

**Bridge No:** 34-0006 **Component:** OBG components.

### **Summary of Items Observed:**

On this day CALTRANS OSM Quality Assurance Inspector (QA) Mr. Shailesh Wadkar was present during the times noted above for observations relative to the fabrication of the Self Anchored Suspension (SAS) Superstructure being performed by Zhenhua Port Machinery Company (ZPMC) at Changxing Island, in Shanghai, China. QA Inspector observed and/or found the following:

Bay 14:

This QA Inspector observed the following work in progress:

OBG Seg 13AW

The Shielded Metal Arc Welding (SMAW) process on weld joint no: SEG3013M-039 [K-plate KP3010A to Floor Beam (FB) 3180, complete joint penetration (CJP) weld, at panel point (PP) 118.35]. The welder is identified as 037748 and was observed welding in the 4G position. ZPMC QC was identified as Li Ping. The welding variables recorded by Quality Control (QC) appeared to comply with WPS: B-P-2214-Tc-U4b-FCM-1.

OBG Seg 13BW + Seg 13CW

Repair welding of weld joint no: OBW13AD-002 [Vertical Plate (VP) 3015A to VP3012A, CJP weld near PP122. 5]. The welder is identified as 045204 and was observed welding in the 3G position. Welding process was identified as SMAW. ZPMC QC was identified as Mr. Wang Xiang Pin. The welding variables recorded by this

# WELDING INSPECTION REPORT

(Continued Page 2 of 3)

QC appeared to comply with WPS: 345-SMAW-3G(3F)-FCM-Repair. Repair welding was done as per Critical Welding Repair Report (CWR): B-CWR 2624 Rev-0.

OBG Seg 13CW

Repair welding of weld joint no: SEG3015U-006 [VP3015A to Side Plate (SP) 3112A, CJP weld at PP124.5]. The welder is identified as 045204 and was observed welding in the 2G position. Welding process was identified as SMAW. ZPMC QC was identified as Mr. Wang Xiang Pin. The welding variables recorded by this QC appeared to comply with WPS: 345-SMAW-2G(2F)-FCM-Repair. Repair welding was done as per Critical Welding Repair Report (CWR): B-CWR 2627 Rev-0.

**OBG Segment 14W** 

The SMAW process on weld joint no: SEG3020AY-233 [Stiffener of Side Plate (SP) 3139A to Floor Beam (FB) 3342A, CJP weld, at PP128.3]. The welder is identified as 037780 and was observed welding in the 3G position. ZPMC QC was identified as Mr. Zhu Lin. The welding variables recorded by QC appeared to comply with WPS: B-P-2213-Tc-U4b-FCM-1.

The SMAW process on weld joint no: SEG3020AY-253 (Stiffener of SP3138A to FB 3342A, CJP weld, at PP128. 3). The welder is identified as 067611 and was observed welding in the 3G position. ZPMC QC was identified as Mr. Zhu Lin. The welding variables recorded by QC appeared to comply with WPS: B-P-2213-Tc-U4b-FCM-1.

The Flux Cored Arc Welding (FCAW) process on weld joint no: SEG3020AY-193 (Stiffener of SP3138A to FB3342A, CJP weld, at PP128.3). The welder is identified as 045175 and was observed welding in the 3G position. ZPMC QC was identified as Mr. Zhu Lin. The welding variables recorded by QC appeared to comply with WPS: B-T-2233-ESAB.

The SMAW process on weld joint no: SEG3020AL-021 (SP3141C to FB3319A, CJP weld, at PP127). The welder is identified as 066038 and was observed welding in the 4G position. ZPMC QC was identified as Mr. Zhu Lin. The welding variables recorded by QC appeared to comply with WPS: B-P-2214-Tc-U4b-FCM-1.

The SMAW process on weld joint no: SEG3020AL-020 (SP3141C to FB3321A, CJP weld, at PP126). The welder is identified as 067942 and was observed welding in the 4G position. ZPMC QC was identified as Mr. Zhu Lin. The welding variables recorded by QC appeared to comply with WPS: B-P-2214-Tc-U4b-FCM-1.

The SMAW process on weld joint no: SEG3020AL-301 (SP3141D to FB3319A, CJP weld, at PP127). The welder is identified as 051348 and was observed welding in the 4G position. ZPMC QC was identified as Mr. Zhu Lin. The welding variables recorded by QC appeared to comply with WPS: B-P-2214-Tc-U4b-FCM-1.

The FCAW process on weld joint no: SEG3020L-079, 080 (BP3088A to FB3325A, Fillet weld, at PP127). The welder is identified as 045276 and was observed welding in the 2F position. ZPMC QC was identified as Mr. Zhu Lin. The welding variables recorded by QC appeared to comply with WPS: B-T-2133-ESAB.

The FCAW process on weld joint no: SEG3020L-081, 081 (BP3089A to FB3325A, Fillet weld, at PP127). The

# WELDING INSPECTION REPORT

(Continued Page 3 of 3)

welder is identified as 066239 and was observed welding in the 2F position. ZPMC QC was identified as Mr. Zhu Lin. The welding variables recorded by QC appeared to comply with WPS: B-T-2133-ESAB.

Unless otherwise noted, all work observed on this date appeared to generally comply with applicable contract documents.

# **Summary of Conversations:**

No significant conversations were reported on this date.

#### **Comments**

This report is for the purpose of determining conformance with the contract documents and is not for the purpose of making repair or fit for purpose recommendations. Should you require recommendations concerning repairs or remedial efforts please contact Eric Tsang; phone: 15000422372., who represents the Office of Structural Materials for your project.

Inspected By:	Wadkar,Sailesh	Quality Assurance Inspector
Reviewed By:	Patterson,Rodney	QA Reviewer